Application No.: 10/553,421 Docket No.: 21581-00455-US Reply with RCE and to Office Action of March 30, 2009

REMARKS

Claims 1, 2, 4-19 and 21 are now in the application. Claims 1, 4-9 and 21 are drawn to the elected invention. Claims 2 and 10-19 have been withdrawn as being directed to a non-elected invention. Claim 1 has been amended to state "to thereby form a suspension of the resin fine particle, and recovering the resin fine particle from the suspension of the resin fine particle". Basis for this amendment can be found at page 11, line 22 to page 12, line 3 of the specification. Claim 1 has also been amended to state both heating and pressurizing and to state that the mixture in step 1 is in an air-tight state for purposes of clarification. Claim 1 has also been amended to include recitations from claim 3. Accordingly, claim 3 has been cancelled without prejudice or disclaimer. Claim 21 has been amended to render it consistent with the amendments to claim 1. The amendments to the claims do not introduce any new matter.

The rejections of the claims under 35 USC 112, second paragraph have been overcome by the above amendments and/or are not deemed tenable.

Claims 1, 4-9 and 21 are rejected under 35 USC 103(a) as being obvious over Japanese patent 2003-268,119 ("JP '119"). JP '119 does not render obvious claims 1, 4-9 and 21.

By way of background, it is important to note that a fluid in a supercritical state or subcritical state has diffusivity which a gas has and solubility which a liquid has. Accordingly, even if the fluid is a poor solvent for a resin at a normal temperature and normal pressure, the fluid can be a good solvent in a supercritical or subcritical state and thus can dissolve and diffuse the resin therein. After that, when the temperature is decreased and the pressure is released, the fluid again becomes a poor solvent; and therefore, the dissolved resin is precipitated. Since the resin is dispersed to a remarkably high extent in the fluid in the supercritical or subcritical state, it is supposed that the precipitated resin is extremely small and almost completely spherical owing to the surface tension. (Please see page 5, lines 22-34 of the specification.)

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To achieve this advantage according to the present invention, the fluid must contain a substance that is present in a liquid form at a normal temperature and normal pressure, and the temperature and the pressure of the fluid are decreased to a normal temperature and normal pressure, while maintaining a air-tight state as recited in the step 2 according to the present invention. As a result, a suspension of the resin fine particles is formed. In the suspension, the resin fine particles become extremely small and almost completely spherical owing to the surface tension.

As appreciated by the Examiner "JP '119 does not explicitly mention an air-tight state for the pressure releasing step. However, it was asserted in the office action that it has been known that a hermetically sealed heating device would allow a desired temperature (or pressure) to be reached faster because there is no heat loss in the process. It was then concluded in the office action that one of ordinary skill in the art would have found it obvious to practice the method of JP '119 under an air-tight state."

Applicant respectfully disagrees with the above conclusion. For example, please see the abstract of JP '119, which states that "The polymer powder is produced by injecting CO2 to a sealed high pressure vessel 1 charged with a polymer (a crosslinked polyethylene) through a liquid feed pump 2, mixing the crosslinked polyethylene with CO2 under a high pressure atmosphere, followed by discharging these into the air (the atmosphere) of a roomtemperature atmospheric-pressure condition through a nozzle la and at the same time. crushing the crosslinked polyethylene using a volume expansion caused by the rapidly reduced pressure and temperature." The technical feature of JP '119 is to crush the polymer by using a volume expansion caused by the rapidly reduced pressure and temperature. Please also see column [0014], which states that "Since it is rapidly breathed out in the air of ordinary temperature ordinary pressure (inside of the atmosphere) from the high temperature-high-pressure state till then at this time and the volume of the carbon dioxide in a mixture increases explosively in the case of the regurgitation, resin becomes a granular material and is breathed out by that expansion force from the delivery of the crosshead 15." Thus, a step of discharging the mixture into the air of a room-temperature is necessary and essential in the method of JP '119, Accordingly, persons skilled in the art would practice the method of JP '119 under an air-tight state. To do so would be contrary to the objectives of JP '119. JP '119 must be considered in its entirety, including disclosures therein that teach away (See MPEP 2141.02 and Bausch & Lomb, Inc. v. Barnes-Hind/Hydrocurve, Inc., 230 USPQ 46 Fed. Cir. 1986) as discussed above. Therefore, if anything, JP '119 establishes the very antithesis of obviousness. See In re Rosenberger 156 USPO 24 (CCPA 1961) and In re Buehler 185 USPQ 781 (CCPA 1975).

Moreover, JP '119 fails to suggest forming a suspension of the resin fine particles as recited according to the present invention. In the present invention the surface tension of polymer in the suspension is used. Without forming a suspension of the resin fine particles, the extremely small and almost completely spherical resin fine particles as achievable by the present invention would not be produced.

The mere fact that the cited art may be modified in the manner suggested in the Office Action does not make the modification obvious, unless the cited art suggests the desirability of the modification or adequate rationale exists to do so. No such suggestion appears in the cited art in this matter nor has the requisite rationale been adequately articulated. . The Examiner's attention is kindly directed to KSR Int'l Co. v. Teleflex, Inc., 127 S. Ct. 1727 (2007); In re Lee 61 USPQ2d 1430 (Fed. Cir. 2002), In re Dembiczak et al. 50 USPQ2d. 1614 (Fed. Cir. 1999), In re Gordon, 221 USPQ 1125 (Fed. Cir. 1984), In re Laskowski, 10 USPQ2d. 1397 (Fed. Cir. 1989) and In re Fritch, 23, USPQ2d. 1780 (Fed. Cir. 1992).

Also, the cited art lacks the necessary direction or incentive to those of ordinary skill in the art to render a rejection under 35 USC 103 sustainable. The cited art fails to provide the degree of predictability of success of achieving the properties attainable by the present invention as discussed above such as the extremely small and substantially completely spherical fine particles needed to sustain a rejection under 35 USC 103. See KSR Int'l Co. v. Teleflex, Inc., supra: Diversitech Corp. v. Century Steps. Inc. 7 USPO2d 1315 (Fed. Cir. 1988), In re Mercier, 187 USPO 774 (CCPA 1975) and In re Navlor, 152 USPO 106 (CCPA 1966). As discussed above, the improved solubility is not suggested by the cited art.

Moreover, the properties of the subject matter and improvements which are inherent in the claimed subject matter and disclosed in the specification are to be considered when evaluating the question of obviousness under 35 USC 103. See KSR Int'l Co. v. Teleflex, Inc, supra; Gillette Co. v. S.C. Johnson & Son, Inc., 16 USPQ2d. 1923 (Fed. Cir. 1990), In re Antonie, 195, USPQ 6 (CCPA 1977), In re Estes, 164 USPQ 519 (CCPA 1970), and In re Papesch, 137 USPQ 43 (CCPA 1963).

No property can be ignored in determining patentability and comparing the claimed invention to the cited art. Along these lines, see *In re Papesch*, supra, *In re Burt et al*, 148 USPQ 548 (CCPA 1966), *In re Ward*, 141 USPQ 227 (CCPA 1964), and *In re Cescon*, 177 USPQ 264 (CCPA 1973).

In view of the above, consideration and allowance are respectfully solicited.

In the event the Examiner believes an interview might serve in any way to advance the prosecution of this application, the undersigned is available at the telephone number noted below.

The Office is authorized to charge any necessary fees due with this paper to Deposit Account No. 22-0185, under Order No. 21581-00455-US from which the undersigned is authorized to draw.

Dated: June 4, 2009 BAA/prb Respectfully submitted,

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